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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|-----------------|-------------|----------------------|---------------------|------------------|
| 10/062,162      | 02/01/2002  | Fabien Cens          | 17.0247             | 8728             |

7590 01/21/2004

Schlumberger Oilfield Services  
Office of Patent Counsel  
P.O. Box 2175  
Houston, TX 77252-2175

EXAMINER

DUVERNE, JEAN F

| ART UNIT | PAPER NUMBER |
|----------|--------------|
|----------|--------------|

2839

DATE MAILED: 01/21/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

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|                              |                               |                             |  |
|------------------------------|-------------------------------|-----------------------------|--|
| <b>Office Action Summary</b> | Application No.<br>10/062,162 | Applicant(s)<br>CENS ET AL. |  |
|                              | Examiner<br>Jean F. Duverne   | Art Unit<br>2839            |  |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 06 November 2003.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1-24 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-22 and 24 is/are rejected.
- 7) ☐ Claim(s) 23 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. §§ 119 and 120

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All   b) ☐ Some \* c) ☐ None of:  
1. ☐ Certified copies of the priority documents have been received.  
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
\* See the attached detailed Office action for a list of the certified copies not received.
- 13) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.  
a) ☐ The translation of the foreign language provisional application has been received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

#### Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)                      4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)                      5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 3/4/2002                      6) ☐ Other: \_\_\_\_\_

## DETAILED ACTION

### *Specification*

1. The abstract of the disclosure is objected to because it is less than fifty (50) words. Correction is required. See MPEP § 608.01(b).

### *Claim Rejections - 35 USC § 102*

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1-2, 5-6 are rejected under 35 U.S.C. 102(b) as being anticipated by Basso et al (US patent 3,868,511).

Baso's device discloses a light path (see fig.1) extending between a first and second zone separated by the sealing gasket (46), the light path comprising at least an optical fiber (56) provided with coating with quartz (see col. 1) passing through the sealing, wherein the sealing gasket capable of withstand the pressure between the first and second zone (see col. 3).

***Claim Rejections - 35 USC § 103***

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 3-4, 7-8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Basso et al (US patent 3,868,511).

In regard to claim 3, Baso's device discloses the pressure level in the tube, but fails to explicitly disclose the pressure level in the tube equal to the atmospheric pressure or the production tube extending in a well passing through geological formations. It would have been obvious to one having ordinary skill in the art at the time the invention was made have to the pressure level in the tube equal to the atmospheric pressure or the production tube extending in a well passing through geological formations, since it has been held that discovering an optimum value of a result effective variable involves only routine skill in the art. In re Boesch, 617 F.2d 272, 205 USPQ 215 (CCPA 1980). It would have been obvious to one having ordinary skill in the art at the time the invention was made to have the pressure level in the tube equal to have the atmospheric pressure or the production tube extending in a well passing through geological formations to meet system design and requirement.

In regard to claim 4, Baso's device discloses the pressure range, but fails to explicitly disclose the pressure range within 0-40,000 psi. It would have been obvious to

one having ordinary skill in the art at the time the invention was made to have the pressure range within 0-40,000 psi, since it has been held that where the general conditions of a claim are disclosed in the art, discovering the optimum workable ranges involves only routine skill in the art. In re Aller, 105 USPQ 233. It would have been obvious to one having ordinary skill in the art at the time the invention was made to have pressure range within 0-40,000 psi to meet system design and requirement.

In regard to claims 7-8, Baso's device discloses the pressure range, but fails to explicitly disclose the material of which the sealing gasket is made of. It would have been obvious to one having ordinary skill in the art at the time the invention was made to have the sealing gasket is made of ceramic, since it has been to within the level skill of a worker in the art to select known material on the basis of its suitability as matter of obvious design choice. In re Leshin, 125 USPQ 416. It would have been obvious to one having ordinary skill in the art at the time the invention was made to have the sealing gasket made of ceramic to meet the system requirement, specification, and design.

5. Claims 9-22, and 24 are rejected under 35 U.S.C. 103(a) as being unpatentable over Baso et al (US patent 3,868,511) in view of Kog (US006189565B1).

Baso's device discloses the pressure range, but fails to explicitly disclose the use of the optical measurement sensor. Skog's device discloses the optical measurement sensor (cols. 3-4). It would have been obvious to one having ordinary skill in the art at the time the invention was made to add optical measurement sensor controlling the signal emission and transmission in Baso's device.

**Conclusion**

**Allowable Subject Matter**

6. Claim 23 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. Prior art fails to disclose the combination features the ratio between the sections of the optical fibers is representative of the quantity of light conveyed in each optical fiber with the rest of the claims limitations.

**Any response to this action may be mailed to:**  
**Commissioner for Patents**  
**P.O. Box 1450**  
**Alexandria, VA 22313-1450**

For additional information regarding this new address, which was effective May 1, 2003, see *Correspondence with the United States Patent and Trademark Office*, 68 Fed. Reg. 14332 (March 25, 2003).

**Or Faxed to:**  
(703) 872-9306.

**Hand-delivered responses** should be brought to:  
Crystal Plaza 4, Fourth Floor (Receptionist)  
2201 South Clark Place, Arlington, Virginia.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jean F. Duverne whose telephone number is (703) 305-0297. The examiner can normally be reached on 9:00-7:30, Monday-Thursday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Lynn Feild can be reached on (703) 308-2710. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0956.

JFD

1/8/2004



Jean Erantz Duverne  
Primary Examiner  
Art Unit 2839